

DELPHI SERIES



FEATURES

- High efficiency: 87% @ 3.3V/5A
- Size: 27.9x24.4x8.3mm (1.1"x0.96"x0.33")
- Industry standard 1x2 pinout
- SMT and Through-hole versions
- 2:1 input voltage range
- Input UVLO, Output OCP, OVP and OTP
- Monotonic startup into normal and pre-bias loads
- Output voltage trim $\pm 10\%$
- 2250V isolation and basic insulation
- No minimum load required
- ISO 9001, TL 9000, ISO 14001, QS9000, OHSAS18001 certified manufacturing facility
- UL/cUL 60950 (US & Canada) Recognized, and TUV (EN60950) certified.
- CE mark meets 73/23/EEC and 93/68/EEC directives

Delphi S48SE, 17W 1x1 Brick Series DC/DC Power Modules: 48V in, 5A out

The Delphi S48SE series, 1x1 Brick, 48V input, single output, isolated DC/DC converters are the latest offering from one of the world's largest power supply manufacturers — Delta Electronics, Inc. This product family is available in a surface mount or through-hole package and provides up to 17 watts of power or 5A of output current (3.3V and below) in a standard 1x1 form factor (1.1"x0.96"x0.33"). The pinout is compatible with the industry standard 1x2 products. With creative design technology and optimization of component placement, these converters possess outstanding electrical and thermal performance, as well as extremely high reliability under highly stressful operating conditions. Typical efficiency of 3.3V/5A module is 87% and all modules are fully protected from abnormal input/output voltage, current, and temperature conditions.

OPTIONS

- SMD module available
- Positive, negative, or no On/Off
- Remote on/off
- OTP and output OVP, OCP mode (Autorecovery or latch)
- Short pin lengths

APPLICATIONS

- Optical Transport
- Data Networking
- Wireless and Telecom
- Servers



SPECIFICATIONS

GENERAL SPECIFICATIONS			OUTPUT SPECIFICATIONS		
Input Voltage		36~75V	Voltage Accuracy	Typical	±1.5%
Switching Frequency	Typical (3.3V)	400KHz	Line Regulation	Typical	±6mV
Isolation Voltage	In/Out	2250V	Load Regulation	Typical	±6mV
Isolation Capacitance	Typical	1nF	Ripple & Noise	Typical	50 mV
Isolation Resistance	Minimum	10M ohm	Current Limits	Typical	120%
MTBF	Bellcore (3.3V)	4.4M hours	Over Voltage	Typical	125%
OTP	Typical	115°C	Voltage Trim		+10%, -10%
Size	(1.10" x 0.96" x 0.33")	27.9mmx24.4mmx8.3mm			

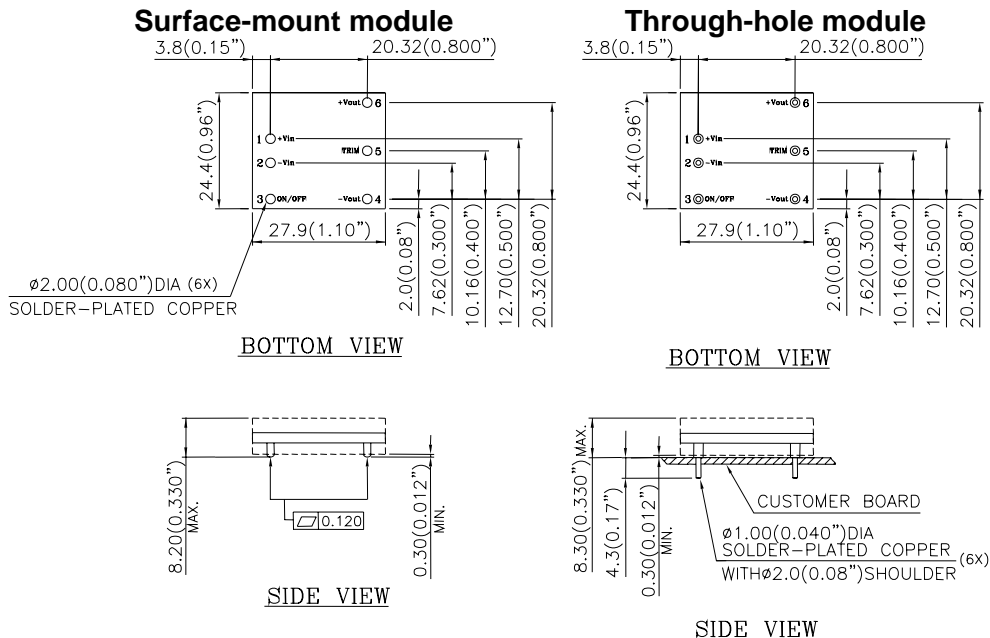
PART NUMBERING SYSTEM

S	48	S	E	3R3	05	N	R	F	A
Product Type	Input Voltage	Number of Outputs	Product Series	Output Voltage	Output Current	ON/OFF Logic	Pin Length/Type		Option Code
S - Small Power	48V	S - Single	1x1, 5A	3R3 - 3.3V 050 - 5.0V 120 - 12V 150 - 15V	01 - 1A 03 - 3A 05 - 5A	N - Negative P - Positive E - No remote on/off control pin	R - 0.170" N - 0.145" K - 0.110" M - SMD	F- RoHS 6/6 (Lead Free)	A - No trim pin B - With trim pin

MODEL LIST

MODEL NAME	INPUT		OUTPUT		EFF @ 100% LOAD
S48SE3R305NRFA	36V~75V	0.6A	3.3V	5A	87.0%
S48SE05003NRFA	36V~75V	0.5A	5.0V	3A	87.0%
S48SE12001NRFA	36V~75V	0.5A	12V	1.3A	88.0%
S48SE15001NRFA	36V~75V	0.5A	15V	1A	87.0%

MECHANICAL DRAWING



NOTES:
 DIMENSIONS ARE IN MILLIMETERS AND (INCHES)
 TOLERANCES: X.Xmm±0.5mm(X.XX in.±0.02 in.)
 X.XXmm±0.25mm(X.XXX in.±0.010 in.)

CONTACT: www.delta.com.tw/dcdc

USA:

Telephone:
 East Coast: (888) 335 8201
 West Coast: (888) 335 8208
 Fax: (978) 656 3964
 Email: DCDC@delta-corp.com

Europe:

Phone: +41 31 998 53 11
 Fax: +41 31 998 53 53
 Email: DCDC@delta-es.com

Asia & the rest of world:

Telephone: +886 3 4526107 ext 6220
 Fax: +886 3 4513485
 Email: DCDC@delta.com.tw

WARRANTY

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